CLARIFICATION OF FIFTH ORBITER OPTION II-MAINTAIN ORBITER PRODUCTION CAPABILITY

This option maintains the production capacity of selected structural parts and major structural assemblies for an additional 1 to 2 years (depending on the element) beyond the normal close-down of the fourth Orbiter. The selected structural parts are those most likely to be damaged in handling incidents or landing accidents (rudder, elevons, speed brake, landing gear, landing gear doors). These parts will be totally finished and ready for installation on the Orbiter when needed. The major structural assemblies are the wings, aft thrust structure engine compartment, crew module including the nose and cockpit, the mid and aft fuselage sections, payload doors, vertical tail and the Orbit Maneuvering System pods. The wings, engine compartment and mid-fuselage will be delivered in FY86, the other parts and assemblies will be delivered in FY84 and FY85. All the major structural assemblies will be completed only up to the point where they are ready for installation of thermal protection system, plumbing, wire harneses, and major electrical, propulsion and hydraulic components. The cost for Option II (in millions of FY84 dollars) is:

FY84	<u>FY85</u>	<u>FY86</u>	<u>FY87</u>	TOTAL
\$90-110	\$100-120	\$90-115	\$60-90	\$350-435

The lead time to deliver an Orbiter will be reduced about 1 to 2 years from the 5 years in Option III (exclusive of engines, which would be started under spares).

For comparison, the cost of Option I to close-down the Orbiter production is:

FY84	<u>FY85</u>	<u>FY86</u>	<u>FY87</u>	TOTAL
\$65	\$85	S40	\$40	\$230

Close-down includes supplemental spares, documentation, storage of tooling and attendant sustaining engineering. Long-lead major structural assemblies are not included in supplemental spares.

For comparison, the cost of Option III to continue full Orbiter production with delivery of the fifth Orbiter in late 1988 is:

FY84	FY85	FY86	<u>FY87</u>	<u>FY88</u>	<u>FY89</u>	TOTAL
\$200	\$325	\$350	\$350	\$320	\$50	\$1,595